IN THE CLAIMS:

Claims 1-26 and 28-46 were previously cancelled. Claims 47, 49, and 52 are herein cancelled. Claims 27 and 50 have been amended herein. All of the pending claims 27 and 47-52 are presented below. This listing of claims will replace all prior versions and listings of claims in the application. Please enter these claims as amended.

Listing of the Claims:

- 1. 26. (Cancelled).
- 27. (Currently amended) A method of producing a pharmaceutical, said method comprising:

identifying a protein that is cleaved in a subject's body by a peptidase to form a peptide having an activity as well as peptide fragments[[,]];

isolating or generating said peptide fragments, said peptide fragments consisting of three (3) or four (4) amino acids;

and analyzing said <u>isolated or generated</u> peptide fragments for biological activity, said peptide fragments comprising peptides consisting of three (3) to nine (9) amino acids in length;

entering data obtained from analyzing said <u>isolated or generated</u> peptide fragments for biological activity into a peptide compound database;

determining the identity of a peptide compound that modulates an activity selected from the group consisting of development of the systemic inflammatory response, release of other inflammatory mediators, regulation of members of the nuclear factor-kB family, accentuation of sepsis or protection from sepsis, nitrate production, nitric oxide production, glucose tolerance and combinations thereof, wherein determining the identity of the peptide compound comprises searching said peptide compound database;

conducting therapeutic profiling of the peptide compound for efficacy and toxicity in animals; and

formulating a pharmaceutical preparation including one or more peptide compounds identified as having an acceptable efficacy and toxicity in animals.

28. - 47. (Cancelled).

- 48. (Previously presented) The method according to claim 27, wherein the biological activity of the peptide fragments is different from the activity of the peptide.
 - 49. (Cancelled).
- 50. (Currently amended) A method of producing a pharmaceutical, said method comprising:

identifying a protein that is cleaved in a subject's body by a peptidase to form a peptide having an activity as well as peptide fragments[[,]];

isolating or generating said peptide fragments, said peptide fragments consisting of three (3) or four (4) amino acids;

and analyzing said isolated or generated peptide fragments for biological activity;

producing a peptide library of said <u>isolated or generated</u> peptide fragments comprising peptides consisting of three (3) to nine (9) amino acids in length;

determining the identity of a peptide compound that modulates an activity selected from the group consisting of development of the systemic inflammatory response, release of other inflammatory mediators, regulation of members of the nuclear factor-kB family, accentuation of sepsis or protection from sepsis, nitrate production, nitric oxide production, glucose tolerance and combinations thereof, wherein determining the identity of the peptide compound comprises searching said peptide library;

conducting therapeutic profiling of the peptide compound for efficacy and toxicity in animals; and

formulating a pharmaceutical preparation including one or more peptide compounds identified as having an acceptable efficacy and toxicity in animals.

- 51. (Previously presented) The method according to claim 50, wherein the biological activity of the peptide fragments is different from the activity of the peptide.
 - 52. (Cancelled).